# 85-20-501. United States Bureau of Land Management-Montana compact ratified.

The compact entered into by the state of Montana and the United States Bureau of Land Management and filed with the secretary of state of the state of Montana under the provisions of 85-2-702 on March 28, 1997, is ratified. The compact is as follows:

# WATER RIGHTS COMPACT STATE OF MONTANA UNITED STATES OF AMERICA, BUREAU OF LAND MANAGEMENT

This Compact is entered into by the State of Montana and the United States of America to settle for all time any and all claims to water for certain lands administered by the Bureau of Land Management within the State of Montana at the time of the effective date of this Compact.

#### RECITALS

WHEREAS, the State of Montana, in 1979 pursuant to Title 85, chapter 2 of the Montana Code Annotated, commenced a general adjudication of the rights to the use of water within the State of Montana including all federal reserved and appropriative water rights;

WHEREAS, 85-2-228, MCA, provides that a federal reserved water right with a priority date of July 1, 1973, or later be subject to the same process and adjudication as a federal reserved water right with a priority date before July 1, 1973;

WHEREAS, 85-2-703 and 85-2-228(3), MCA, provide that the state may negotiate settlement of claims by the federal government to non-Indian reserved waters within the State of Montana:

WHEREAS, the United States wishes to quantify and have decreed the amount of water necessary to fulfill the purposes of two Bureau of Land Management units in the State of Montana, specifically those reserved water rights necessary to preserve the Upper Missouri National Wild and Scenic River and the Bear Trap Canyon Public Recreation Site;

WHEREAS, the United States Attorney General, or a duly designated official of the United States Department of Justice, has authority to execute this Compact on behalf of the United States pursuant to the authority to settle litigation contained in 28 U.S.C. 516-17 (1968);

WHEREAS, the Secretary of the Interior, or a duly designated official of the United States Department of the Interior, has authority to execute this Compact on behalf of the United States Department of Interior pursuant to 43 U.S.C. 1457 (1986, Supp. 1992);

NOW THEREFORE, the State of Montana and the United States agree as follows:

# ARTICLE I

#### **DEFINITIONS**

For purposes of this Compact only, the following definitions shall apply:

- (1) "Annual Report" means the report prepared by the Montana Department of Natural Resources and Conservation providing information concerning water appropriations issued, modified, revoked, or abandoned in that year that affects the quantity of water in the Available Water Supply, and the current status of the Available Water Supply.
- (2) "Available Water Supply" or "AWS" means those monthly amounts of surface and groundwater available to meet the state's projected demands, as identified in Table 1, in the Missouri River basin upstream from the point the Missouri River leaves the boundary of the Upper Missouri National Wild & Scenic River beyond that necessary to satisfy the United States' reserved water right. All depletions from appropriations completed after December 31, 1987, shall be subtracted from the Available Water Supply.
- (3) "Bear Trap Canyon Public Recreation Site" or "BTCPRS" means those lands located in Montana that, pursuant to authority granted by Executive Order No. 10355 of May 26, 1952, were withdrawn and reserved by Secretary of the Interior Public Land Order 5062 (Montana 17093), published in the Federal Register on June 9, 1971.
- (4) "BLM" means the United States Bureau of Land Management or its successor.
- (5) "Department" means the Montana Department of Natural Resources and Conservation or its successor.
- (6) "Depletion" means, for water uses subtracted from the Available Water Supply, the amount of water reduced in the source of supply for each month as calculated in accordance with the Method for Calculation of Monthly Depletions. A depletion is a standard reduction amount based on depletion factors for the type of use as opposed to a measured deduction or a term, condition, restriction, or limitation on an appropriation.
- (7) "Groundwater" means any water that is beneath the ground surface.
- (8) "HYDROSS Model" means the United States Bureau of Reclamation's Hydrologic Operations Study (HYDROSS) model for the Missouri River basin upstream from the point that the Missouri River leaves the boundary of the Upper Missouri National Wild & Scenic River. The HYDROSS Model is a water supply model that uses monthly water supply studies derived from a period of flow records to simulate the effect of existing and proposed water demands on the historic naturalized flow of the Missouri River. The HYDROSS model and information used to develop the model are archived in the Montana state library.
- (9) "Instream flow" means the water that the parties agree shall remain in the stream in satisfaction of the United States' reserved water right for the purposes of the federal reservation.

- (10) "Method for Calculation of Monthly Depletions" means the procedure the Department will follow in calculating depletions subtracted from the Available Water Supply for appropriations completed after December 31, 1987. The Method for Calculation of Monthly Depletions is incorporated in this Compact and attached as Appendix 1.
- (11) "Non-Consumptive Use" means a beneficial use of water that does not cause a reduction in the source of supply and in which substantially all of the water returns without delay to the source of supply, causing little or no disruption in stream conditions.
- (12) "Parties" means the State of Montana and the United States.
- (13) "State" means the State of Montana and all officers, agents, departments, and political subdivisions thereof. Unless otherwise indicated, "state" means the Director of the Montana Department of Natural Resources and Conservation or the Director's designee.
- (14) "Supplemental Water" means a new appropriation issued for the same purpose of use and place of use already covered by a valid appropriation, with the same (or reduced) period of use, flow rate and, if applicable, volume of water. To be considered supplemental, no aspect of the new appropriation may exceed that of the original valid appropriation and only one appropriation or part of each may be used at the same time.
- (15) "Upper Missouri National Wild & Scenic River" or "UMNW&SR" means the segment of the Missouri River located in Montana that, pursuant to the Wild and Scenic Rivers Act, 16 U.S.C. 1271, et seq, (1986, Supp. 1992), was designated as a component of the National Wild and Scenic Rivers System by Public Law 94-486, Title II, 90 Stat. 2327-2329, on October 12, 1976.
- (16) "United States" means the federal government and all officers, agencies, departments, and political subdivisions thereof. Unless otherwise indicated, for purposes of notification or consent other than service in litigation, "United States" means the Secretary of the Department of the Interior or the Secretary's designee.

#### ARTICLE II

#### WATER RIGHT

The parties agree that the following water rights are in settlement of the reserved water rights of the United States for the reservations described. The parties to this Compact recognize that the water rights described in this Compact are junior to any Tribal water rights with a priority date before the effective date of this Compact, including aboriginal rights, if any, in the basins affected. All reserved water rights described in this Article are subject to Article V, section A.

A. Instream Flow for the Upper Missouri National Wild and Scenic River.

- 1. Priority Date: The United States has a priority date of October 12, 1976, for the water right described in this Compact for the UMNW&SR.
- 2. Instream Flow: The United States has a water right for instream flow in the Mis souri River from Fort Benton one hundred and forty-nine miles downstream to Fred Robinson Bridge, as specifically depicted on the map attached as Appendix 2. The water right is in the amount of the remaining flow of the river after (1) all water appropriations completed before December 31, 1987; (2) the volumes of water designated for the Available Water Supply as provided in Article III, section A; and (3) uses not subtracted from the Available Water Supply as provided in Article III, section C.
- B. Instream Flow for the Bear Trap Canyon Public Recreation Site.
- 1. Priority Date: The United States has a priority date of June 9, 1971, for the water right described in this Compact for the BTCPRS.
- 2. Instream Flow: The United States has a water right for instream flow in the Madison River which flows over the reserved land of Bear Trap Canyon Public Recreation Site, more specifically described as T4S R1E Sec. 20 SW1/4 downstream to T3S R1E Sec. 15 NE1/4. The water right is in the amount of 1,100 cubic feet per second from January 1 through December 31.

#### ARTICLE III

# UMNW&SR WATER RIGHT IMPLEMENTATION

## A. Available Water Supply.

The HYDROSS model incorporates information on water uses completed on or before December 31, 1987. The Department will calculate depletions from appropriations completed after December 31, 1987, on a monthly basis in accordance with Article III, section B and subtract such depletions from the water volumes designated for the Available Water Supply as set forth in Table 1.

# TABLE 1 AVAILABLE WATER SUPPLY MONTHLY AMOUNTS

Month	Acre-feet
January	104,000
February	121,000
March	124,000
April	185,000
May	219,000
June	62,000

July	82,000
August	66,000
September	40,000
October	35,000
November	57,000
December	98,000

- B. <u>Method for Calculation of Monthly Depletions Subtracted from the Available Water Supply.</u>
- 1. <u>Surface Water</u>. Except as provided in Article III, section C, the Department will calculate depletions from surface water based on monthly depletion factors for various types of water use in accordance with the Method for Calculation of Monthly Depletions attached as Appendix 1 in the month that the use occurs. The Department will subtract monthly depletions from the AWS monthly amounts.
- 2. <u>Groundwater</u>. Except as provided in Article III, section C, the Department will calculate depletions from groundwater based on monthly depletion factors for various types of water use in accordance with the Method for Calculation of Monthly Depletions attached as Appendix 1 and spread the depletions in equal increments throughout the year with 1/12th of the annual depletion volume subtracted from each AWS monthly amount.
- 3. Stored Water. Except as provided in Article III, section C, the Department will calculate depletions from stored water based on monthly depletion factors for various types of water use for the months of use in accordance with the Method for Calculation of Monthly Depletions attached as Appendix 1, but subtract such depletions from the AWS in the months when diverted as calculated in accordance with the Method for Calculation of Monthly Depletions attached as Appendix 1. The Department will calculate evaporation depletions in accordance with the Method for Calculation of Monthly Depletions attached as Appendix 1 and subtract such depletions from the AWS monthly amounts.
- 4. <u>Water Reservations</u>. Except as provided in Article III, section C, the Department will calculate depletions from state water reservations granted pursuant to 85-2-316 but not completed on or before December 31, 1987, based on the monthly depletion factors for various types of water use in accordance with the Method for Calculation of Monthly Depletions attached as Appendix 1 and subtract such depletions from the AWS monthly amounts, except that the Department will not subtract depletions from Water Reservation No. 72579-41T from the AWS monthly amounts. The Department will process state water reservations subtracted from the AWS monthly amounts that are abandoned, revoked, modified, or found invalid pursuant to Article III, section D.
- C. Uses Not Subtracted from the Available Water Supply.
- 1. <u>Non-Consumptive Use</u>. The Department will not subtract non-consumptive uses from the AWS monthly amounts.

- 2. <u>Uses of 35 gallons per minute or less, not to exceed 10 acre feet per year</u>. The Department will not subtract groundwater uses of 35 gallons per minute or less, not to exceed 10 acre feet per year, and surface water appropriations of 35 gallons per minute or less, not to exceed 10 acre feet per year for domestic use from the AWS monthly amounts.
- 3. <u>Supplemental Water</u>. The Department will not subtract supplemental water uses from the AWS monthly amounts.
- 4. <u>Lawn and Garden</u>. The Department will not subtract depletions for appropriations to irrigate an area 5 acres or less from the AWS monthly amounts.
- 5. <u>Instream Stock Uses</u>. The Department will not subtract instream stock uses from the AWS monthly amounts.
- 6. <u>Late Claims</u>. The Department will not subtract valid late claims as defined by 85-2-221, MCA (1995) from the AWS monthly amounts.
- 7. <u>Federal and Tribal Water Rights</u>. The Department will not subtract water rights created under federal law, water rights recognized in satisfaction of water rights created under federal law, and water rights owned by individuals that are derived from water rights created under federal law from the AWS monthly amounts.
- D. Additions to the Available Water Supply.
- 1. <u>Abandonment</u>. When an appropriation right on a stream affected by this Compact is abandoned after December 31, 1987, and such abandonment causes water to become available for appropriation, the Department will calculate the previous depletion amount in accordance with the Method for Calculation of Monthly Depletions and add such amount to the water volumes designated for the Available Water Supply. State law governs the issue of whether an abandonment has occurred.
- 2. <u>Modified, Revoked, or Invalid Appropriations</u>. When an appropriation right on a stream affected by this Compact is modified, revoked, or found invalid and such modification, revocation, or invalidation causes water to become available for appropriation, the Department will calculate the previous depletion amount in accordance with the Method for Calculation of Monthly Depletions and add such amount to the water volumes designated for the Available Water Supply.
- E. <u>Basin Closure</u>. Except for the uses provided for in Article III, section C, in the Missouri River basin upstream from the point that the Missouri River leaves the boundary of the UMNW&SR the Department shall not process or grant an application for an appropriation in any month in which the water volume designated for the Available Water Supply has been exhausted.

F. <u>Prohibition on Future Mainstem Impoundment</u>. No new impoundments may be permitted on the mainstem of the Missouri River upstream from the UMNW&SR. Reclamation, repair, or rehabilitation of an existing impoundment shall not be considered a new impoundment, <u>provided that</u>, without the consent of the United States, which for nonfederal power generating impoundments under the Federal Energy Regulatory Commission's jurisdiction shall be obtained through the Federal Energy Regulatory Commission, reclamation, repair, or rehabilitation shall not cause the impoundment to exceed the original constructed capacity of the impoundment.

# G. Administration and Reporting by the State.

- 1. <u>Department Administration</u>. The Department will administer the AWS by subtracting depletions from the monthly available water amounts following the procedures set forth in the Method for Calculation of Monthly Depletions attached as Appendix 1. In order to monitor the water volumes in the AWS, the Department will calculate preliminary monthly depletions and subtract the amounts from the AWS. The Department will make final subtractions from the AWS when the Department determines that an appropriation is complete pursuant to 85-2-315 or 85-2-316(8)(b), MCA.
- 2. <u>Annual Report</u>. The Department will produce an Annual Report by March 1st of each year detailing its actions in administering the AWS for the previous calendar year, provided that the first Annual Report after ratification of this Compact shall include information concerning water appropriations issued, completed, modified, revoked, found invalid, or abandoned since January 1, 1988, through the previous calendar year. The Annual Report is final on April 15 of the year issued unless on or before that date the BLM submits written comments or a request for an annual meeting to the Department. If an annual meeting is requested, it shall be held within thirty days of the request. The Department will make a final decision and issue a final Annual Report by June 1, unless the Department and the BLM agree to a different date.
- 3. <u>Cooperative Review Process</u>. The Department and the BLM will create a cooperative review process to allow discussion of depletion factors and depletion amounts assigned to the undefined uses as listed in the Method for Calculation of Monthly Depletions attached as Appendix 1 and any other issues concerning the Annual Report. Subject to Article III, section H(1), the Department will make the final decision concerning the administration of the AWS. The Department and the BLM will develop a Memorandum of Understanding describing the cooperative review process within six months of the ratification of this Compact.
- 4. <u>Changes to the Method for Calculation of Monthly Depletions</u>. The parties may make changes to the Method for Calculation of Monthly Depletions attached as Appendix 1 by written agreement and such changes shall not be deemed a modification of this Compact.
- H. Action for Enforcement of Provisions of Article III.

The United States may file an action in a court of competent jurisdiction to enforce the provisions of Article III as follows:

- 1. Enforcement of Administration of Available Water Supply. After the Annual Report becomes final in accordance with Article III, section G(2), the United States shall have 90 days to file an action for enforcement of the provisions of Article III, section G of this Compact concerning the administration of the AWS. Any action challenging the administration of the AWS may consist only of trial de novo of the Department's actions for the previous calendar year. The United States may not challenge the Department's actions concerning administration of the AWS contained in previous Annual Reports. Except for appropriations issued in violation of Article III, section E, any court order concerning this subsection shall be limited to calculating depletion amounts from the AWS and does not affect the appropriations issued, revoked, modified, or abandoned or any other decision of the Department.
- 2. <u>Enforcement of Other Provisions of Article III</u>. The United States may file an action for enforcement of any provision of Article III except Article III, section G at any time.
- 3. No Standing to Object. The United States does not have standing to object to an application for an appropriation or change in appropriation right, or to participate in a revocation or modification proceeding, based on the property, water right, or interests of the United States for the UMNW&SR, provided that, for an appropriation applied for with a point of diversion or means of conveyance within the boundaries of the UMNW&SR, the Department shall not grant the appropriation unless the Department expressly conditions the appropriation on obtaining the necessary authorization for entry and use from the United States, and provided further that nothing in this Compact shall limit the United States' standing to object based on any other water rights of the United States or the reserved water right for the BTCPRS.
- 4. <u>Exclusive Remedy</u>. The remedy set forth in this section is the exclusive remedy for enforcement of Article III of this Compact. The United States shall not have to exhaust any administrative remedies in order to enforce Article III of this Compact.

# ARTICLE IV

#### BTCPRS WATER RIGHT IMPLEMENTATION

A. <u>Subject to Prior Uses</u>. The United States' federal reserved water right for instream flow for the segment of the Madison River which flows over the reserved land of Bear Trap Canyon Public Recreation Site is subject to all water rights with a priority date before June 9, 1971 recognized under state or federal law. Nothing in this Compact may affect an existing right to divert water from a point within the BTCPRS and transport it for use outside the BTCPRS.

B. <u>Change in Instream Flow Right</u>. The federal reserved water right for instream flow as described in Article II, section B, shall not be changed to any other use.

- C. <u>Notice of Reopening of Madison River Basin</u>. The Department shall notify the BLM if an application for a state water reservation pursuant to 85-2-316, MCA, may be processed and granted within the Madison River basin, as such basin is defined by 85-2-340(4).
- D. <u>Enforcement of Water Right</u>. The United States may file an action in a court of competent jurisdiction to enforce the federal reserved water right described in Article II, section B.
- E. <u>Venue for Appeal of Administrative Decisions</u>. For any appeal of an administrative decision, venue shall be the First Judicial District in Helena and the review shall be conducted according to the procedures for judicial review of contested cases under the Montana Administrative Procedures Act, Title 2, chapter 4, of the Montana Code Annotated.

#### ARTICLE V

# GENERAL PROVISIONS

- A. No Effect on Tribal Rights or Other Federal Reserved Water Rights.
- 1. The relationship between the water rights of the Bureau of Land Management described herein and any rights to water of an Indian Tribe in Montana, or of any federally derived water right of an individual, or of the United States on behalf of such Tribe or individual shall be determined by the rule of priority.
- 2. Nothing in this Compact may be construed or interpreted in any manner to establish the nature, extent, or manner of administration of the rights to water of any Indian Tribes and Tribal members in Montana.
- 3. Nothing in this Compact is otherwise intended to conflict with or abrogate a right or claim of an Indian Tribe regarding boundaries or property interests in the State of Montana.
- 4. Nothing in this Compact may be construed or interpreted in any manner to establish the nature, extent, or manner of administration of the rights to water of any other federal agency or federal lands in Montana other than those of the Bureau of Land Management for the UMNW&SR and the BTCPRS.

## B. General Disclaimers.

Nothing in this Compact may be construed or interpreted:

1. as a precedent for the litigation of reserved water rights or the interpretation or administration of future compacts between the United States and the state; or of the United States and any other state;

- 2. as a waiver by the United States of its right under state law to raise objections in state court to individual water rights claimed pursuant to the state Water Use Act, Title 85, of the Montana Code Annotated, in the basins affected by this Compact, or, except as provided in this Compact, any right to raise objections in an appropriate forum to individual water rights subject to a provisional permit under the state Water Use Act, Title 85, of the Montana Code Annotated, in the basins affected by this Compact;
- 3. as a waiver by the United States of its right to seek relief from a conflicting water use not entitled to protection under the terms of this Compact;
- 4. to establish a precedent for other agreements between the state and the United States or an Indian tribe;
- 5. to determine the relative rights, <u>inter sese</u>, of persons using water under the authority of state law or to limit the rights of the parties or a person to litigate an issue not resolved by this Compact;
- 6. to create or deny substantive rights through headings or captions used in this Compact;
- 7. to expand or restrict any waiver of sovereign immunity existing pursuant to federal law as of the effective date of this Compact;
- 8. to affect the right of the state to seek fees or reimbursement for costs or the right of the United States to contest the imposition of such fees or costs, pursuant to a ruling by a state or federal court of competent jurisdiction or Act of Congress;
- 9. to affect in any manner the entitlement to or quantification of other federal water rights. This Compact is only binding on the United States with regard to the water rights of the BLM, and does not affect the water rights of any other federal agency that is not a successor in interest to the water rights subject to this Compact.

# C. <u>Use of Water Right</u>.

The rights of the United States described in Article II of this Compact are federal reserved water rights. Non-use of all or a part of the federal reserved water rights described in this Compact shall not constitute abandonment of the right. The federal reserved water rights described in this Compact need not be applied to a use deemed beneficial under state law, but shall be restricted to uses necessary to fulfill the purposes outlined in applicable federal law.

## D. Concurrent with other Non-consumptive Water Uses.

The federal reserved water right for instream flows for the UMNW&SR and the BTCPRS recognized by this Compact shall run concurrently with any other non-consumptive water uses including but not limited to all hydropower uses and other instream flow uses.

# E. Appropriation Pursuant to State Law.

Nothing in this Compact may prevent the United States from seeking a water appropriation pursuant to state law for use on the reserved land within the UMNW&SR or the BTCPRS or for use outside the boundaries of the federal reservations for which a water right is described in this Compact, <u>provided that</u> a water right obtained in this manner shall be considered a state water right and shall be administered pursuant to state law.

# F. Reservation of Rights.

The parties expressly reserve all rights not granted, described, or relinquished in this Compact.

# G. Severability.

The provisions of this Compact are not severable, <u>provided that</u> for the purposes of 85-2-702(3), MCA, the water rights described in this Compact for the Upper Missouri National Wild and Scenic River and Bear Trap Canyon Public Recreation Site shall be considered as separate Compacts.

# H. Multiple Originals.

This Compact is executed in quintuplicate. Each of the five (5) Compacts bearing original signatures shall be deemed an original.

# I. Notice.

Unless otherwise specifically provided for in this Compact, service of notice, except service in litigation, shall be:

- 1. <u>State</u>: Upon the Director of the Department and such other officials as the Director may designate in writing.
- 2. <u>United States</u>: Upon the Secretary of the Interior and such other officials as the Secretary may designate in writing.

#### ARTICLE VI

#### FINALITY OF COMPACT

## A. Binding Effect.

1. The effective date of this Compact is the date of the ratification of this Compact by the Montana legislature, written approval by the United States Department of the Interior, or

written approval by the United States Department of Justice, whichever occurs later. Once effective, all of the provisions of this Compact shall be binding on:

- a. the state and a person or entity of any nature whatsoever using, claiming or in any manner asserting a right under the authority of the state to the use of water; and
- b. except as otherwise provided in Article V, section A, the United States, a person or entity of any nature whatsoever using, claiming, or in any manner asserting a right under the authority of the United States to the use of water.
- 2. Following the effective date, this Compact shall not be modified without the consent of both parties. Any attempt to unilaterally modify this Compact by either party shall render this Compact voidable at the election of the other party.

## B. Settlement of Claims.

The parties intend that the water rights described in this Compact are in full and final settlement of the reserved water right claims for the UMNW&SR and the BTCPRS. Pursuant to this settlement, by which certain federal reserved water rights are expressly recognized by the state in this Compact, the United States hereby and in full settlement of any and all claims filed by the United States or which could have been filed by the United States for the UMNW&SR and the BTCPRS relinquishes forever all said claims on the effective date of this Compact to water within the State of Montana for reserved water rights for the above mentioned units. The state agrees to recognize the reserved water rights described and quantified herein, and shall, except as expressly provided for herein, treat them in the same manner as any other appropriation.

C. The parties agree to defend the provisions and purposes of this Compact from all challenges and attacks.

IN WITNESS WHEREOF the	e representatives	of the State of	f Montana and the	United
States have signed this Compa	act on the	day of	, 19	

## Appendix 1

Method for Calculation of Monthly Depletions

## A. Surface Water.

Depletion factors are grouped by the use codes now employed by the Department, and the monthly depletion factors for each type of water use are set forth below.

1. Fishery, Wildlife, Recreational, and Wildlife/Waterfowl Uses:

FS Fishery FW Fish and Wildlife RC Recreation

WW Wildlife/Waterfowl.

The water loss resulting from fishery, wildlife, recreational, and wildlife/waterfowl uses occurs as evaporation from small ponds. The following table lists the monthly depletion factors for evaporative loss in feet per surface acre:

# Monthly Depletion Factors for Evaporation

January	0.00
February	0.00
March	0.00
April	0.08
May	0.17
June	0.26
July	0.50
August	0.51
September	0.35
October	0.26
November	0.04
December	0.00

The Department will calculate monthly depletions from evaporation by multiplying the above factors by maximum reservoir surface area (acres).

# 2. Geothermal and Power Generation Uses:

GE Geothermal

PG Power Generation.

The Department will determine depletions from geothermal and power generation uses on a case-by-case basis.

# 3. Domestic, Multiple Domestic, and Municipal Uses:

**DM** Domestic

MD Multiple Domestic

MC Municipal.

The Department will calculate monthly depletions from domestic uses over 35 gallons per minute, exceeding 10 acre feet per year, multi-family domestic, and municipal uses by multiplying the annual volume by the monthly depletion factors set forth below.

Monthly Depletion Factors for Domestic, Multiple Domestic, and Municipal Uses

.0135
.0135
.0270
.0315
.0450
.0585
.0810
.0675
.0495
.0360
.0135
.0135

# 4. <u>Irrigation including Lawn and Garden over 5 Acres</u>:

# IR Irrigation

LG Lawn and Garden.

The Department will calculate monthly depletions from irrigation uses (in acre feet) by multiplying the number of acres by the depletion factors set forth below.

# Monthly Depletion Factors for Irrigation Uses Monthly Depletion Factor

# Month (feet per acre)

January	0.0
February	0.0
March	0.0
April	0.0
May	0.2604
June	0.4656
July	0.7417
August	0.5885
September	0.1177
October	0.0
November	0.0
December	0.0

The Department will calculate monthly depletions from lawn and garden uses to irrigate an area greater than 5 acres using the method for irrigation set forth above.

# 5. Stock Uses:

ST Stock.

The Department will calculate monthly depletions from stock ponds using the monthly depletion factors for evaporation listed in Appendix 1, section A(1).

# 6. Commercial, Industrial, Institutional, Mining, and Other Uses:

CM Commercial

IN Industrial

IS Institutional

MN Mining

OP Other Purpose

The Department will assign monthly depletions from commercial, industrial, institutional, mining, and other undefined uses as 50% of the annual volume spread in equal increments throughout the period of use. The Department will make any necessary changes to the assigned monthly depletions to reflect actual depletions when the appropriation is complete. The Department and the BLM may discuss the monthly depletions at the annual meeting and the Department will make the final monthly depletion determination.

7. <u>Transbasin Diversions</u>: The Department will calculate monthly depletions for transbasin diversions outside the drainage area of the Missouri River and its tributaries upstream from the point that the Missouri River leaves the boundary of the Upper Missouri National Wild & Scenic River at 100% of the diverted amount.

#### B. Groundwater.

The Department will subtract all groundwater uses over 35 gallons per minute, exceeding 10 acre feet per year, from the AWS monthly amounts regardless of location or source aquifer. The Department will calculate depletions from groundwater uses based on monthly depletion factors for the type of water use as listed in Appendix 1, section A and spread the depletions in equal increments throughout the year with 1/12th of the annual depletion volume subtracted from each AWS monthly amount.

## C. Stored Water.

The Department will calculate depletions from storage projects by determining the annual depletion based on the monthly depletion factors for the type of use for which the water is stored as listed in Appendix 1, section A and subtract such depletion from the AWS monthly amounts as set forth in the schedule below. For purposes of subtracting the annual depletion for the type of use from the AWS monthly amounts, the Department will apply the following depletion schedule to all reservoirs unless the appropriation issued specifies a different fill regimen.

Monthly Storage Depletion Schedule

Month % of Calculated

Depletion
7%
8%
7%
7%
10%
21%
38%
2%
100%

The Department will also subtract the monthly depletions from evaporation based on the monthly depletion factors for evaporation listed in Appendix 1, section A(1).